



AUTHORIZED
INFORMATION TECHNOLOGY SCHEDULE PRICELIST
GENERAL PURPOSE COMMERCIAL INFORMATION TECHNOLOGY
EQUIPMENT, SOFTWARE AND SERVICES

Special Item No. 132-33 Perpetual Software Licenses Supply Chain Solutions
Special Item No. 132-34 Maintenance of Software

Royal 4 agreements with GSA terms and conditions

Royal 4 Systems has sold Warehouse Management, Asset Management, Inventory Management, Accounting –Sales and Web based (COTS) software (132-33) and support maintenance (132-34) to the commercial business sector for 25 years. Royal 4 Systems is offering a 50% discount on software under this schedule and guarantees to GSA the lowest pricing available by Royal 4 Systems. Royal 4 offers support & maintains on all software sold for both the Commercial sector and Public sector under this agreement at 18% of the final cost of software.

Royal 4 Software offerings 132-33

For your business, government agencies, manufacturers and distributors alike, the warehouse is the critical hub of the business, the central depot through which everything must pass — from raw materials waiting to be manufactured into finished goods to product waiting for shipment downstream to a distribution center, retailer or end-customer. Our product known as “WISE” can be applied throughout all core warehouse processes, transforming the warehouse into a competitive advantage. Our Software provides solutions for all eight points of planning and execution across the supply chain. Specific areas of functionality are Warehouse Management for inventory, raw materials and assets , Business performance Modeling Transportation Management , Distribution Management for 3PL & 4PL, Yard – Gate and Appointment management, Order Management, Shipping Management, and Financial Management . All are extended applications to mobility through hand held computers utilizing RF, RFID, Imaging and Voice technology. Our warehouse management application suite (WISE) is the core of our Supply Chain Solution. WISE has user defined location rules, package types, picking rules, shipment procedures, packaging techniques, and all other significant details regarding your operations. WISE then optimizes these tasks for you based on detailed algorithmic rule engines. These extensive WISE Functions are available to improve the distribution center’s operations by minimizing costs and increasing productivity. Crystal Reports and Bar-Tender are imbedded in WISE for all reporting and label needs. Both standard and ad-hoc are built into standard WISE.

Maintenance & Support 132-34

Royal 4 warrants that during the twelve (12) months following shipment (the “Warranty Period”), the Software provided by Royal 4 will materially or substantially perform in accordance with the Documentation in effect at the time of shipment. Our professional support staff is trained to assist you in every way that is required to assure you 100% up time and optimal performance. We have support people in the US, Europe and South America for 24/7 365 day availability if required. Our standard maintenance fees include both support and maintenance during business hours of 6 a.m. to 6 p.m. (PST) Monday through Friday. Extended support is available on a per negotiated agreement.



SIN 132-33 - PERPETUAL SOFTWARE LICENSES

FSC CLASS 7030 - INFORMATION TECHNOLOGY SOFTWARE

Large Scale Computers

- Operating System Software
- Application Software
- Electronic Commerce (EC) Software
- Utility Software
- Communications Software
- Core Financial Management Software
- Ancillary Financial Systems Software
- Special Physical, Visual, Speech, and Hearing Aid Software

Microcomputers

- Operating System Software
- Application Software
- Electronic Commerce (EC) Software
- Utility Software
- Communications Software
- Core Financial Management Software
- Ancillary Financial Systems Software
- Special Physical, Visual, Speech, and Hearing Aid Software

SIN 132-34 - MAINTENANCE OF SOFTWARE

1. Software Maintenance as a Product

Software maintenance as a product includes the publishing of bug/defect fixes via patches and updates/upgrades in function and technology to maintain the operability and usability of the software product. It may also include other no charge support that are included in the purchase price of the product in the commercial marketplace. No charge support includes items such as user blogs, discussion forums, on-line help libraries and FAQs (Frequently Asked Questions), hosted chat rooms, and limited telephone, email and/or web-based general technical support for user's self diagnostics.

Software maintenance as a product does NOT include the creation, design, implementation, integration, etc. of a software package. These examples are considered software maintenance as a service.

2. Software Maintenance as a Service

Software maintenance as a service creates, designs, implements, and/or integrates customized changes to software that solve one or more problems and is not included with the price of the software. Software maintenance as a service includes person-to-person communications regardless of the medium used to communicate: telephone support, on-line technical support, customized support, and/or technical expertise which are charged commercially. Software maintenance as a service is billed arrears in accordance with 31 U.S.C. 3324.



Royal 4 Systems
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WWW.Royal4.com

Contract Number: GSA Contract Number GS-35F-0512V

Period Covered by Contract: June 10, 2009 through June 09, 2014

General Services Administration
Federal Acquisition Service

Pricelist current through Modification #_____, dated June 10, 2009.

Products and ordering information in this Authorized FSS Information Technology Schedule Pricelist are also available on the GSA Advantage! System. Agencies can browse GSA Advantage! by accessing the Federal Acquisition Service's Home Page via the Internet at <http://www.fss.gsa.gov/>

- Royal 4 System certifies that they are a Small Software Developer Business.
- Royal 4 Systems have acknowledged the requirement, as set forth in Clause I-FSS-597 entitled, "GSA Advantage!" by signature of the Standard Form 1449.
- Royal 4 Systems is active in the Central Contractor Registration (CCR) and, which is valid until Feb 16th 2010.
- Royal 4 System is registered in the Online Representations and Certifications Application (ORCA) system and shall ensure that it kept current, accurate and complete.
- TIN: 953950427
- DUNS Number: 17-577-8133
- Products offered are manufactured in Long Beach California, USA and are therefore in accordance with the Trade Agreement Act.

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Overview of Royal 4 Systems

Introduction

Royal 4 Systems, Inc. is a global leader of supply chain management, providing technology-based logistics solutions since 1984. Royal 4 Systems has been implementing Logistics solutions including software, services and hardware for multi-national operations. Our best of breed solutions increase the effectiveness and efficiencies of companies within and across the supply chain.

Today, Royal 4 Systems has more than 250 customers world-wide. Our leading software provides cost effective supply chain technology solutions from Warehouse Management, Inventory and Asset Management to Financial Planning Back Office Systems. Our 3PL partners have facilities ready to manage every fulfillment requirement, from coast to coast and across the water.

Royal 4 Systems has been implementing Logistics and Financial solutions using technology to manage all aspects of the supply chain. Our products operate on multiple platforms utilizing various hardware systems and inter-operate with many third-party software applications and legacy systems. This interfacing and open system capability enables customers to continue using their existing computer resources and to choose among a wide variety of existing and emerging computer hardware and peripheral technologies. We provide interface tools for most systems. We currently offer standard interfaces to systems developed by Oracle, SAP, Microsoft, Sage, Lawson, ADA, QAD, and more

Our solutions are implemented by world class professionals that are well trained, dedicated, and experienced to meet the demanding needs of today's complex environment. Our professionals have spent decades of research and development in solving some of the most difficult challenges facing supply chain management. Royal 4 Systems has corporate offices in Long Beach, California and affiliates all over the world.

Royal 4 Systems also provide services, including design, configuration, implementation and training services, plus customer support services and software enhancements.

We currently provide our solutions to manufacturers, distributors, retailers and transportation providers primarily in the following markets: retail, consumer goods, food and grocery, third-party logistics, industrial and wholesale, high technology and electronics, healthcare and pharmaceuticals, government and transportation. Our software has been licensed for use by approximately 260 customers including International Intimates, MKW Alloy, Seaboard Marine, ARD Logistics, Key Logistics, Zinik Luxury Wheels, Foster Jeans, Jel-Sert Wyler Foods, Zodiac Industries, Toyo Tires, Red Barn 3PL, Leatherman Tools, V-Pet plastics, Kaiser Hospitals, Lexani Wheels, J & R Electronics, Kohl Packing, Xerox Corporation, Four Seasons Distribution, C & D Aerospace, Dollar Empire, Claxton Cold Storage, Richman Meats, Beacon Looms, Pacific Apparel, Fort Storage, Black & Decker, Metraflex, Phillips Van Heusen, Bearing Engineering, Akzo Nobel Chemical and Merck.



Royal 4 Products

Royal 4 products and services are designed to enable our customers to manage the operations of their distribution centers and improve visibility of critical information between supply chain partners to achieve greater effectiveness and efficiency. Our software products operate on standard WINDOWS computing platforms as well as UNIX. Our products operate on multiple hardware platforms utilizing various hardware systems and inter-operate with many third-party software applications and legacy systems. This interfacing and open system capability enables customers to continue using their existing computer resources and to choose among a wide variety of existing and emerging computer hardware and peripheral technologies. We provide interface toolkits for most ERP systems to enhance communication and reduce implementation costs between our core products and our clients' host systems. We currently offer standard toolkits to systems developed by SAP, QAD, Lawson, Infor, ASA, Sage and Microsoft.

Our Software provides solutions for all eight points of planning and execution across the supply chain. Specific areas of functionality are Warehouse Management for inventory, raw materials and assets (WMS), Business performance Modeling (BPM) Transportation Management (TMS), Distribution Management for 3PL & 4PL (DMS), Yard – Gate and Appointment management (YM), Order Management (OM), Shipping Management, (SM) and R4 Financial Management & R4 ERP Manufacturing. All are extended applications to mobility through hand held computers utilizing RF, RFID, Imaging and Voice technology.



GSA price list for all Royal 4 Products June 10, 2009

Part Number	Product Description	GSA Price with IFF	Country of Origin	SIN
2000	WISE Inventory System Expert per user	\$4,030.00	US	132-33
	Asset – Inventory - Warehouse Management			
2001	BPM Business Performance Manager	\$4,030.00	US	132-33
2002	TMS transportation Management per site	\$15,112.50	US	132-33
2003	3PL activity billing Module per site	\$7,556.25	US	132-33
2004	YM Yard Manager per site	\$2,518.75	US	132-33
2005	OM Order Manager for WISE per site	\$3,526.25	US	132-33
2006	SM Shipping Manager per user	\$2,015.00	US	132-33
3000	RFID for WISE per user	\$2,518.75	US	132-33
4000	Voice Picking for WISE per user	\$4,030.00	US	132-33
4001	R-4 Financials AP, GL, AR, AP per user	\$4,030.00	US	132-33
5000	R-4 ERP for manufacturing per user	\$4,030.00	US	132-33
1100	Test/Backup & Development License copies per Server	\$3,022.50	US	132-33
6001	XML module	\$3,022.50	US	132-33
6002	EDI Standard forms & connection to VAN	\$5,037.50	US	132-33
9000	SQL Server Db Driver per user	\$302.25	US	132-33
9001	Oracle Db Driver per user	\$302.25	US	132-33
8000	Support & Maintenance	18%	US	132-34



Royal 4 WMS – WISE Inventory & Asset Management

For your business, government agencies, manufacturers and distributors alike, the warehouse is the critical hub of the business, the central depot through which everything must pass — from raw materials waiting to be manufactured into finished goods to product waiting for shipment downstream to a distribution center, retailer or end-customer. WISE can be applied throughout all core warehouse processes, transforming the warehouse into a competitive advantage.

Our warehouse management application suite (WISE) is the core of our Supply Chain Solution. WISE has user defined location rules, package types, picking rules, shipment procedures, packaging techniques, and all other significant details regarding your operations. WISE then optimizes these tasks for you based on detailed algorithmic rule engines. These extensive WISE Functions are available to improve the distribution center's operations by minimizing costs and increasing productivity. Crystal Reports and Bar-Tender are imbedded in WISE for all reporting and label needs. Both standard and ad-hoc are built into standard WISE.

Business needs solved

- Improves inventory accuracy;
- Increases inventory turnover and lowers inventory levels;
- Improves order throughput;
- Reduces response times;
- Improves real-time communications with other supply chain participants;
- Complies with industry shipping standards;
- Reduces transportation costs;
- Increases labor and equipment productivity;
- Enables and facilitates distribution through multiple delivery channels;
- Improves customer relationships, thereby increasing orders; and
- Improves real-time visibility both within the enterprise and across the entire supply chain.

The warehouse

Receiving

With Royal 4's WISE, enterprises can enable workers at the receiving dock with real-time access to the purchase order database along with automated data capture — either bar code scanning or the ability to read RFID labels. Paperwork is eliminated and data collection is automated, improving the velocity of the receiving function:

- Incoming shipments are automatically identified and instantly reconciled.
- Proper processing orders for the shipment are immediately delivered right to the worker's handheld computer — from where to stage accurate shipments for put-away or cross docking to how to handle any errors in the shipment.
- Productivity is improved through process automation, enabling the same workforce to process more shipments per day.
- Dock-to-stock cycle times are reduced.



- Real-time inventory visibility allows you to intelligently direct put-away or conveyance for items that are low in stock first, reducing the opportunity for costly out-of-stocks to impact the order fulfillment process.
- The instant visibility into the order system enables cross docking to effectively reduce handling time and costs for incoming shipments.

Put-away

Real-time access to the warehouse management inventory system and automated data collection capabilities can greatly improve the put-away function:

- Electronic put-away orders are delivered right to the mobile device, including the exact location for put-away as well as most efficient route to that location.
- When workers arrive at the put-away location, a quick scan of the bar code on the shelf tag (or read of an RFID shelf tag) not only ensures the item is put in the correct place, but also provides a record of the location of that exact receipt.
- Throughput is improved, since items reach the shelves in the shortest amount of time.
- Productivity is improved — the same number of workers can process more put-away orders each day.
- Increased inventory visibility reduces stocking inventory levels and related warehouse space requirements.
- Out-of-stocks are reduced — inventory reaches the shelves more rapidly, preventing a false out-of-stock that can result in a lost order.
- The information is available to implement first-in first-out (FIFO), last-in first-out (LIFO), or first expire first-out (FEFO) inventory management — all of which can have a significant positive impact on the company's profitability analysis and tax liabilities
- Asset utilization of material handling equipment (MHE) such as forklifts and clamp trucks is improved — travel time in the warehouse aisles is reduced, which in turn reduces wear and tear and maintenance requirements for the vehicles

Cross docking

WISE enables on-the-spot visibility into the order database, providing the real-time information required to reach a new level of efficiency in the cross dock function. Workers can scan the bar codes or read the RFID tags to identify incoming shipments. In the event the shipment fulfills an open order, cross docking information is immediately delivered to the worker's mobile computer, delivering a number of benefits in this warehouse function:

- Productivity is improved through process automation — the same number of workers can process more shipments per day, driving labor costs down.
- Labor time and costs are reduced — shipments are handled once instead of multiple times, since the need for shipments to be staged for put away, placed on the warehouse shelves, picked, packed and re-staged for shipment is eliminated.
- Errors are reduced — real-time information ensures that the right shipment is delivered to the right dock and loaded onto the right truck.



- Visibility into all the shipments slated for cross docking allows for increased efficiencies in movement between docks — instead of moving each shipment individually, shipments bound for the same dock can be aggregated.
- Usage times and wear and tear for forklifts and other material handling equipment are reduced through more efficient use of material handling equipment (MHE).

Sorting

When workers in the sorting function are armed with a comfortable wearable mobile computer and access to the orders database and shipping application, workers can scan a package and automatically receive instructions for most efficient action (staging, put-away or shipment) — in just seconds. Now:

- Productivity is improved — the same number of workers can sort more packages per hour, improving labor costs.
- Errors are reduced — bar code scanning eliminates the possibility of data entry errors, which in turn eliminates sorting errors.
- Order accuracy and shipping times are increased, improving order fill rates and customer satisfaction.

Returns

Through WISE automation, enterprises can provide workers in the returns area with instant access to inventory, accounting and order systems as well as advanced data capture capabilities such as bar code scanning and image capture. The wealth of paperwork so common in this function can be virtually eliminated:

- A quick scan of an item bar code or RMA label can instantly validate the return and update business systems with the disposition of the return.
- Workers can snap a picture to provide proof of condition for returns records, eliminating potential customer disputes.
- Customer credit, if due, can be issued immediately along with instant customer notification.
- Items returned to inventory are automatically noted in the inventory systems, instantly available for fulfillment of new orders.
- Overall processing time is reduced, improving worker productivity and ensuring prompt returns processing to protect customer satisfaction levels.

Cycle counts

When cycle counters are armed with real-time on-the-move access to the inventory database and advanced mobile data collection capabilities, efficiency and accuracy in this function are dramatically improved. Workers with a mobile RFID reader mounted on a cart can take a full and error-free cycle count in the time it takes to push a cart through the warehouse aisles. Counts that may have taken three or four weeks in the past can be completed in hours. The new level of cost-efficiency allows enterprises to easily and quickly take daily cycle counts, resulting in unprecedented inventory visibility that enables:

- Better trend analysis for improved buying practices
- Reduced inventory stocking levels
- Reduced capital expenditures for holding inventory
- Reduced space requirements for inventory

Picking

With WISE farther upstream in the put-away function, you already know what products are on your warehouse shelves and where they are located. When you add real-time access to your order and inventory business systems, you can automatically deliver electronic picking orders to a mobile device that includes a pick list along with the fastest route to the items. A quick scan of a shelf tag, bar code or RFID tag provides instant verification that the right item has been picked, and the item is instantly deducted from inventory. Now:

- Productivity is increased — the same number of workers can process more orders per day, driving the cost of doing business down.
- Errors are significantly reduced through the automated capture of data and instant double check for picking accuracy.
- Out-of-stocks are eliminated through the ability to instantly deduct items from your inventory as they are picked.
- The ability to deliver granular picking information enables LIFO/FIFO/FEFO picking for better inventory management.
- The ability to instantly store serialized product information with customer orders enables enterprises to expeditiously locate any product or parts that have been recalled, reducing liability as well as the high costs associated with tracking products that have already been delivered to your distribution channel or end customer. And product warranties can be accurately registered to the customer with the correct effective date, ensuring that customers receive the support to which they are entitled.
- Product information can be leveraged to prevent damage during picking operations. For example, prior to picking up an item, a scan of a bar code or RFID tag can provide clamp truck operators with the appropriate pressure setting for the clamps. This valuable mobility application helps reduce the high cost associated with the delivery of damaged equipment — from the cost of the return and re-shipment to the cost of an unsatisfied customer.

Packing, staging and shipping

WISE can streamline these final stages of order fulfillment, ensuring that the right order contains the right products, and is shipped to the right customer at the right time via the right method of shipment:

Packing

- Improved order accuracy — a quick scan of items during the packing process serves as a crucial cross-check of order accuracy.
- Improved order fulfillment — real-time inventory visibility enables packers to easily see any if any backordered items are now in stock, enabling completion of the shipment prior to leaving your facility. Order handling time and costs are reduced, and customers receive product more rapidly and with less shipping and handling costs, improving customer satisfaction.
- Packing material costs are reduced — based on the items in an order, your business system can automatically determine the right size carton for the shipment, removing guesswork and eliminating the use of excess amounts of filling materials.
- Labeling compliance for transportation of hazardous materials and exported goods is ensured.



Staging and shipping

- Improved shipping accuracy:
 - A quick scan of the bar code or RFID tags on cartons or pallets provides a valuable cross-check to ensure that the order is correct, properly addressed and scheduled for the proper shipment method, complete with on-the-spot printing of all necessary paperwork.
 - Integration of dispatch data ensures that the shipment is properly staged for loading on the right truck in the right order.
 - Costly miss-ships are eliminated.
- Productivity is increased — the same staff can now ship more orders per day.
- Shipping and delivery times are improved.
- Customer service and satisfaction are improved — customers are more likely to receive orders when promised, with the right items, promoting higher customer retention levels.
- Vehicle utilization is improved — trucks are fully loaded with the right shipments.
- Driver productivity is increased — staging in the correct order enables drivers to spend less time at each stop.

Asset tracking

WISE can completely automate the asset tracking process through the use of RFID. When permanent hardened RFID tags are placed on all assets that are critical to order fulfillment, such as totes and pallets, RFID readers automatically capture tag information as the assets move through the warehouse:

- Superior tracking of assets is enabled without any manpower — and assets such as totes and pallets can easily be associated with a specific customer order.
- Real-time asset visibility greatly reduces loss and theft, and enables better management of assets — the right asset is always available at the right time, eliminating any delay in order processing.
- Lower stocking levels are possible due to the reduction in loss, reducing capital expenses.
- Since assets now remain in your inventory longer, asset lifecycles are increased, reducing the total cost of ownership (TCO) and improving the return on investment (ROI) for these often high-dollar items.

Operations management

Royal 4 can get your warehouse managers out of the office and back on the warehouse floor by enabling the extension of all the necessary desktop tools right to the palm of their hands. With a rugged integrated voice and data mobile device built to endure the harsh environment of the warehouse:

- Managers can keep their desk phone, email, and access to all business systems in their literal pockets.
- Managers and supervisors can remain out on the warehouse floor instead of at the desk, where they can better protect overall productivity and throughput.
- Efficiency and effectiveness of managers is maximized.



BPM - Business Performance Modeling MODULE

The R4-BPM provides OLAP (Online Analytical Processing) capabilities for performance tracking. It gives the users the ability to measure and track business performance to establish an indication of current activity, a target for success, or a goal for the future. The R4-BPM enables users to explore large volumes of summarized data with sub-second response times in a web, windows, or excel environment. With the R4-BPM, users at any business or technical skill level can perform their own multidimensional analysis, create reports, and share them for better decision-making. The R4-BPM draws information from WISE's relational databases to model and build power cubes. Cubes are data sets that can contain tens of millions of consolidated rows of data and hundreds of thousands of categories or members. Business rules and calculations (for example, percentage growth and market share change) can be integrated while time series analysis is delivered automatically. Cubes and reports can be disseminated to web clients or to windows and excel clients all using the same application server.

Royal 4's Transportation Management – MODULE

The Transportation Management System module receives the orders picked from the warehouse and can weigh, rate and process all necessary documentation as per the customer's instructions or best shipping method to reduce transportation costs. The TMS then updates the WISE warehouse management system, which updates the host system live as orders are processed and shipped. The system can also send out email notifications of shipped orders to your customers.

Features include:

- Outbound shipment manifesting
- Transportation planning and pre-routing for best service selection
- Supports UPS, RPS, USPS, Fed X, Airborne and LTLs & others
- Carrier and customer compliant label generation including required carrier tracking numbers
- Electronic manifesting for most carriers
- Reports module allowing both standard and customer created reports on demand

Transportation

Transportation is a highly mobile function — drivers are out on the road and moving nearly 100 percent of the time, making tight management of vehicles and drivers a challenge. In addition, this function is burdened with the need to collect a lot of data to meet government regulations, translating into large volumes of forms and other paperwork. Mobility outside your four walls can connect all the people and assets in this function directly to your business systems regardless of where they may be, eliminating paperwork and providing the visibility required to improve overall management. Mobility in the transportation function enables:



More effective load schedules

The ability to see and best match available loads with available trucks maximizes asset use and minimizes mileage and fuel costs, while ensuring timely arrival at the end destination. And maximum asset utilization enables more deliveries with the same fleet, also providing a path for cost-effective growth.

Dynamic route changes

All throughout the day, situations occur that require immediate response — for example, a top tier customer may have an emergency pickup, or another delivery truck may have broken down on the road. When drivers carry a mobile voice and data device with integrated GPS technology, dispatchers can see the location of all vehicles, enabling the instant re-routing of the closest vehicle to maintain service levels and minimize costs. Maximum asset utilization Mobility can provide the real-time data required to automatically calculate the utilization of each vehicle in the fleet. Fleets that are under-burdened can be reduced — reducing capital expenditures for vehicles as well as reducing the labor and parts costs associated with vehicle maintenance. In addition, the ability to marry maintenance records with each truck ensures proactive scheduling of maintenance to ensure trucks are kept in top running condition, reducing the high cost of downtime.

Real-time proof-of-delivery (PoD)

When proof-of-delivery moves from paper to mobile WISE computer, proof of delivery information, including time of delivery and the recipient's name, can be transmitted to the office instantly. If the mobile device is equipped with imaging capabilities, drivers can capture signatures electronically and snap a quick picture to document the condition of the shipment. This information can then be transmitted instantly to the home office, shaving weeks off of the cash-to-cash cycle time.

Cost-effective regulatory compliance

As government regulations increase in volume as well as complexity, mobile computing keeps compliance simple and cost-effective. A WISE mobile connection eliminates the need for drivers to complete paperwork and process logs. And on-board GPS equipment enables a paperless and automated collection and reporting of required data for U.S. State Fuel Tax forms and Department of Transportation (DOT) logs.

Pro-active safety management

WISE mobile computing can be applied to record and transmit engine statistics and on-board events, including sudden acceleration or deceleration, speeds and diagnostic warnings to enable proactive management of driving habits as well as the reconstruction of an accident or other event based on



historical data. This capability enables transportation organizations to identify and remove drivers who perpetually practice unsafe driving habits:

- Improve driver safety records
- Reduce the potential for accidents
- Reduce insurance and liability

3PL-4PL Distribution - MODULE

Activity billing and order management are central to your 3PL success. The WISE 3PL Order/Billing module provides a comprehensive range of owner-based reports and multiple billing methods that are critical for 3rd party operations including Flexible Billing Periods, split month storage, Full Month, Anniversary, Rent, Regular Handling, Accessorial billing, Value added services like kitting and Work Orders, Extra labor and overtime, Physical inventory, and more. Web based interoperability with clients provide real time access and improved customer service. Interoperability through the internet connects all your agents and customers to you in real time. WISEMove allows you to manage activities, pricing and job order status anywhere at any time. WISEMove manages common activities, such as pick, pack, delivery, moves, value added services, estimating, receiving, unpacking, and much more. Centrally manage Vaults and locations that may span clients' storages and your multiple facilities. Dynamic task and resource planning keep your facilities optimally filled and strategically organized. Whether it is HHG (House Hold Goods) or assets we are managing, WISEMove improves productivity.

The Distribution Center Order Processing

The R4 order processing (OP) module has two functions (Order/Quote Entry and Pre-Quote Entry) that were designed to maximize the efficiency of personnel on the phone. Available to the order takers or salesmen are inventory look-ups by item numbers, descriptions, attributes and quantity information by warehouse, at a glance such as On-hand, Available, On-Order and On-PO/WO. In addition, interfaces accept customer sales orders from EDI (850) transmissions and Web order entry front ends. Up to ten different standard prices can be defined by warehouse per item and a pricing matrix allows promotional pricing and combinations by customer, customer-type, territories, and salesman to be matched to items and product-groups.

Orders are processed (picked, packed and shipped) through the Order Management and shipment scheduling functions in WISE. On-line transaction processing with complete audit capability tracks customer orders from initial creation all the way through shipment and invoicing. The various sales reports can be used to spot trends, evaluate customers, products, and salesman performance.

Purchasing

The R4 purchasing module (PO) integrates with IM, AP, OP, MRP, DRP and WISE and is capable of converting requisitions from Drop Shipments, MRP, DRP into purchase orders. Requisitions generated from MRP/DRP plan executions place timely orders while maintaining low safety stock. In addition to



regular PO's, blanket PO's are supported. The tight integration with IM allows recording of inventory values from purchases at Fob or landed prices.

Purchase orders interface to WISE as expected receipts. Receipts of product are done in WISE with the aid of RF devices and barcode labels and guided to warehouse locations based on put away plans. Also supported are container tracking (In transit) and receiving, and receipt reconciliation with vendor invoices. Drop shipping logic permits direct shipments from vendors to customers without creating virtual receipts.

Distribution Requirements Planning (DRP)

The R4 DRP module is designed for multiple warehouses, order fulfillment centers and distribution center environments. Information from inventory management, purchasing, order processing and demand forecasting, combine to produce an accurate and timely picture of all distribution requirements up and down the supply chain. DRP attempts to balance the inventories and meet needs at the various facilities by generating re-supply orders to purchase product from other facilities or manufacturing locations. The DRP module executes requirement plans, driven by inventory policies and transfers requirements through the MPS and MRP modules to the supplying locations. This results in the following benefits:

- Reduced inventory investment.
- Reduced purchasing costs.
- Increased Productivity.
- Improved customer service.

EDI

To handle the volume of data interchanged to & from your organization and trading partners, it is necessary to exchange transactions such as Purchase Orders, Invoices, ASN's, etc. in an automated standard electronic form rather than in paper form. Some of the benefits of Electronic Data Interchange, over manual paper transactions are:

1. Speed of transactions.
2. Timeliness of Transactions.
3. Labor savings (One time data entry).
4. Streamlined operations processing for Receiving and Shipping
5. Higher accuracy.
6. Better Customer Service

Royal 4's Yard Management – MODULE

The Yard Management System module is a natural extension of the WISE warehouse management solution. Yard management is the function of managing the inventory of trailers or empty trailers parked outside the warehouse. Yard Management is generally associated with cross docking operations and may include the management of both inbound and outbound trailers.



Features include:

- Appointment tracking
- Trailer check-in & check-out
- Trailer movements
- Yard inventory report
- Email alerts

The yard

In distribution, the yard is key to the daily movement of goods — all incoming inventory and outgoing customer orders must pass through this portal to and from the warehouse. This critical link in your supply chain is a virtual outdoor extension of the warehouse — serving as outdoor storage for incoming inventory, and providing the final step in order processing for all outbound shipments. Through the automation afforded by mobility, enterprises can reduce errors and increase throughput in the yard — without adding staff or assets. A new level of information visibility is achieved — and the sharing of this information with your other business systems forms a bridge that enables new levels of efficiency in the travel of supplies and goods throughout your supply chain.

Cross docking and interleaving

The new expanded view of the entire yard enables the implementation of two functions that can further enhance the productivity in the yard: cross docking and interleaving. The moment a shipment arrives at the guard station, dispatchers can see exactly what is in the shipment and the entire dock schedule, allowing appropriate shipments to be cross-docked to reduce shipment handling time and inventory handling cost. That same visibility also enables very judicious movement of trailers, known as interleaving. A trailer parked at an inbound dock for unloading might be identified as the right type of trailer for an outbound load that is ready on a nearby dock. Instead of returning the trailer to the yard, the trailer can be delivered immediately to the outbound dock for loading — rather than taking an interim trip to the yard.

Improved gate throughput

When guards at the gate are outfitted with real-time mobile computing devices, the check in process for arriving vehicles can be highly automated. Trucks can be immediately identified and loads reconciled with purchase orders, eliminating long delays at the gate and gate congestion — without adding guard stations or guards.

Improved load sequencing at the dock

WISE ensures that the right trailer is scheduled for the right dock at the right time. Dispatchers no longer need to wait for paper to trickle down from the guard station to obtain the information needed to best



schedule dock appointments — the information is transmitted wirelessly the moment it is collected. Now, all the critical information dispatchers need to create the most effective dock schedules is instantly available, including: trailer type, trailer content (down to the SKU level), load type (perishable, dry or hazardous), length of time trailer can be on the lot before penalty charges are issued by the carrier, purchase order associated with the load, and any errors or exceptions to the purchase order.

Royal 4's Order Management – MODULE

Royal 4 System's collaborative order management and supply chain execution solution, delivers total coordination of receiving, production, quality, maintenance, warehousing, shipping and third party billing operations as they occur. WISE supports your lean distribution initiatives by spotlighting non-value and value-add activities while standardizing your operating processes. Order demand is fulfilled directly from warehouses, distribution outlets, or production without the delays associated with batch - and frequently outdated - planning cycles. It is a comprehensive enterprise solution that promotes full collaboration between your employees, customers, suppliers and business partners. WISE's Order Management functionality is a flexible tool used to group and release orders for shipment. This easy-to-use functionality gives the manager the capabilities of releasing single orders or groups of orders based on order number, customer ID, destination, dates, FIFO/LIFO carriers, priorities, and any combination thereof. At any point in the warehouse order process an order can be immediately cancelled and WISE will generate all the necessary tasks to re-stock the items already in the picking or shipping process. Specific Order Prioritization pushes orders that require special handling or expediting to automatically be assigned in the system to receive priority within the task pool.

Features include:

- Order consolidation and sequencing
- Paperless transactions eliminate paperwork costs while maximize quality
- Cross docking reduces inventories and eliminates redundant picking and put-away activity
- Accurate, up-to-date web inventory visibility maximizes order fill rates, accelerates revenues, and minimizes inventory control costs.
- Improved customer satisfaction resulting from better responsiveness to customer needs, improved product quality, shipping accuracy and billing accuracy.
- Proposes put away tasks according to your warehouse navigation rules for each individual customer.
- Performs and keeps track of all value added functions and bills accordingly.
- Proposes put away tasks according to your warehouse navigation rules for each individual customer.
- Performs and keeps track of all value added functions and bills accordingly.

Royal 4's Shipping Management – MODULE

WISE supports many different pick & packing methods. The most common is to pick from general storage, then take the goods to the predetermined packing stations where the "packer" takes over the next



step of the order's process. If the user has defined that they are picking an individual order or orders, WISE can then pick from general storage locations and put the items directly into the packing container ready for shipment. This is also termed "palletization" if the packing container is a pallet and the entire pallet is used to ship. WISE's Cartonization functionality enables the warehouse manager to use the item's cube information based upon entered weight and dimensions of merchandise to be packed for put-away for best location space utilization. After the items for an order have gone through all of the user defined steps including pick, pack, and palletize, it can then be shipped. The orders can be consolidated into one shipment based on order number, container, carrier, wave, zip code, or state. WISE's detailed shipping logic allows for these variables and any combination thereof. The shipments' delivery order sequence can be automatically picked and staged for loading based upon delivery route. The pickers will be directed to "pick-to-nose" in order to ensure that the last delivery is loaded first. At shipping, all of the necessary outbound documentation is produced including but not limited to invoice, packing lists, shippers export doc/ AES transmission, shippers letter of instruction, NAFTA certificates, bank document, domestic bills of lading, dock receipt, hazardous goods documents, and domestic carrier labels. Orders being processed at different times for the same destination can be consolidated at time of shipping to reduce transportation charges including UPS hundred weight, LTL carrier, or other. WISE can be integrated directly to each of the individual shipping manifest systems of the parcel carrier companies. The shipping manifest can be automatically sent to UPS, Federal Express, or other to insure accurate billing and tracking of shipments. This tracking and freight information is then stored in WISE for reference and automatic email notifications.

Shipping

- Improved shipping accuracy:
 - A quick scan of the bar code or RFID tags on cartons or pallets provides a valuable cross-check to ensure that the order is correct, properly addressed and scheduled for the proper shipment method, complete with on-the-spot printing of all necessary paperwork.
 - Integration of dispatch data ensures that the shipment is properly staged for loading on the right truck in the right order.
 - Costly miss-ships are eliminated.
- Productivity is increased — the same staff can now ship more orders per day.
- Shipping and delivery times are improved.
- Customer service and satisfaction are improved — customers are more likely to receive orders when promised, with the right items, promoting higher customer retention levels.
- Vehicle utilization is improved — trucks are fully loaded with the right shipments.
- Driver productivity is increased — staging in the correct order enables drivers to spend less time at each stop.

RFID Capabilities – MODULE

More and more today the DoD and commercial market are demanding RFID solutions. Royal 4 Systems has imbedded the capabilities to utilize all the latest formats, and certified capabilities used today in both Government and Commercial applications. Hardware needs to be configured accordingly.

Voice Capabilities – MODULE



Picking in a highly automated and fast paced environment requires hands free operations. With WISE Voice, you have the option to switch between traditional bar codes and RFID as well as voice for the Picking process. Voice is imbedded within WISE making this an easy addition should a business require the functionality after an initial implementation. There are hardware considerations to budget.

Royal 4's Financial Module - R4

The R4 financial software application is a fully integrated Enterprise Resource Planning system (ERP) and part of a complete supply chain solution with WISE and the Web based products. R4 gives you choices with complete financial, distribution, manufacturing, planning, utilities and a report writer (Crystal Reports). All modules and utilities were written and developed by Royal 4 Systems, in a fourth Generation Language (4GL), within a RAD Environment and utilizes a powerful embedded relational database (RDBMS), which is supplied with the package.

The R4 solution operates in a truly open environment, within various operating systems such as Windows (2000, XP, 2003, NT, Vista, etc.) and different flavors of Unix (Aix, SCO, HP-UX, Dec-Vax, Linux, etc.). The application runs on any popular hardware platform, which includes AS400, DELL, HP, SUN, Unisys, Gateway, etc.

FINANCIALS

For manufacturers and distributors, R4 delivers a multi-entity, multi-currency and multi-lingual enterprise resource planning system. This system fully integrates financial management with operations management and provides support for inventory controls, materials management, manufacturing, warehousing and project accounting. At the base of the financial modules is a flexible security and internal control system that helps organizations meet critical new compliance regulations such as Sarbanes-Oxley.

R4's enterprise resource planning systems incorporate financials that add to a company's competitive advantage by streamlining financial processes and reducing costs, increasing accuracy of financial data and providing better oversight of expenses and cash flow.

As a manufacturer or distributor, your needs are focused on individual customer requirements and the ability to respond to volatile customer demands with a variety of products in a very competitive environment.

In a warehousing environment you need to control the movement of product in an accurate and efficient manner. Vendor information is critical in order to determine best available price, on time delivery, quality merchandise, and reliability. R4's financial suite of modules (General Ledger, Accounts Payable, Accounts Receivable and Project Accounting), ensures that all these needs are met. Fixed Assets and Payroll are additional financial suite offerings.

General Ledger



The General Ledger (GL) module of R4 has a multi-company, multi-entity, multi-currency and multi-lingual capability. Besides a chart of accounts, R4 also offers a unique entity table that allows definition of company codes, divisions, branches, cost centers, or in some cases product lines.

Accounting periods can be defined as calendar or fiscal periods, depending on company policy; soft closing of month-ends permit 24 accounting periods to be left open, before year-end processing is done. The R4 GL module is integrated with various financial, distribution and manufacturing modules. Transactions created by these various modules, generate journal entries that are interfaced to the General Ledger module. Additionally, excel uploads, regular, reversing, recurring and automatic distribution journal entries are all possible within the GL module. The GL module also supports company designed financial statements, comparative actual versus budget statements and variable budgeting with import and export functionality between spreadsheet and budget files. Crystal Reports (on board report writer) allows direct exports of financials to Microsoft's Excel.

Accounts Payable

Completely integrated with G/L, P/O and Project Accounting modules, the R4 A/P module features extended capabilities such as, voucher processing and management, vendor performance analysis, multiple-entity account distributions, parameter generated check runs, manual disbursements, hand-typed check recording and debit/credit memo issuances. Also included is cost capture by project, reconciliation of cashed checks, outstanding checklist printing, daily cash analysis tools and 1099 data capture. Working in conjunction with the PO module, vouchers are generated after the three-way matching of PO, receiving and vendor invoice processing is completed.

The Accounts Payable module of **R4** is designed to provide the management tools to help give you the maximum control over your payables. Cash analysis reporting provides management with the ability to track daily bank activity and maintain proper cash float levels. Effective reports such as voucher and check registers, AP Distribution, AP Aging and AP Management Summary support an accounting department's efforts during month-end closings.

Accounts Receivable

R4's Accounts Receivable module (AR) is designed to provide management with the tools to effectively manage a company's customer base. It is integrated with other financial and distribution modules and is responsible for accumulating billing and credit activity by customer. In addition, all payments made by customers are applied to open receivables, which helps in the management of a customer's credit availability, a major component of the order processing cycle.

The AR module is also responsible for charge-back recording and tracking, commission set-up and calculation, allowance and rebate management and creation of credit management parameters. A robust cash application function uses batch control and is designed for faster payment and deduction application. Sales commissions are calculated as a percent of sales or gross profit, commissions are considered earned and subject to payout at the time of A/R collections or at the end of the month following the sale. Daily and month-end reports such as sales and payment journals, AR Distribution, AR Aging, AR Management Summary and Commission Report support an accounting department's efforts during month-end closings.



Project Accounting

The R4 project accounting (aka project or job costing) module is a comprehensive business solution that is fully integrated with the financial and distribution modules. R4's project accounting software helps companies manage complex, multi-year projects profitably.

Companies can budget at the project level, manage project related assets, track and record cost in the most appropriate work breakdown structure. Summary and detailed reports provides the information to keep projects on target.

R4's Project Accounting module gives you control over your projects; prototyping, product development cost tracking, monitoring of company owned delivery vehicles, construction in progress for projects, are some examples of how project accounting can assist a company in controlling costs.

Fixed Assets

R4's fixed asset module (FA) offering integrates with the GL module to interface monthly book depreciation or amortization entries. Additionally, the FA module was designed to calculate both book and tax depreciation (federal and state). The FA module supports multiple depreciation methods (straight-line, DDB, DB, sum of the years, AMT, etc.) and multiple books (Internal, Federal, State, AMT).

Effective reports reflect asset additions and retirements, depreciation taken monthly and YTD, depreciation projections for budgeting purposes and net asset value reporting. In addition to fixed assets, prepaid expenses, long-term deferrals, or any intangible asset requiring monthly amortization can be maintained on the FA module.

Purchasing

The R4 purchasing module (PO) integrates with IM, AP, OP, MRP, DRP and WISE and is capable of converting requisitions from Drop Shipments, MRP, DRP into purchase orders. Requisitions generated from MRP/DRP plan executions place timely orders while maintaining low safety stock. In addition to regular PO's, blanket PO's are supported. The tight integration with IM allows recording of inventory values from purchases at Fob or landed prices.

Purchase orders interface to WISE as expected receipts. Receipts of product are done in WISE with the aid of RF devices and barcode labels and guided to warehouse locations based on put away plans. Also supported are container tracking (In transit) and receiving, and receipt reconciliation with vendor invoices. Drop shipping logic permits direct shipments from vendors to customers without creating virtual receipts.



Inventory Management

At the heart of the R4 financial, distribution, manufacturing and planning modules is the inventory management (IM) module. Equipped with a robust item master, the IM module interfaces with all of the main modules in the ERP software, WISE and Web modules. In conjunction with WISE, the IM module, an integral part of the supply chain, supports multiple warehouse and distribution center operations. Inventories are entity-based, valued using multiple cost methods, tracked down to the lot or serial number level, can be used for simulation what-if testing, and has complete integration to other modules.

Item costs are carried for two purposes, inventory valuation by warehouse and to support manufacturing standards. Additionally, customer sales pricing begins at the item level by warehouse. A unique feature, which is now a part of the item master, is the ability to define item attributes, primarily used for item searches, has also been used by our customers to create the item number and automate the creation of the BOM structure and production operations.

Return Material Authorization

The R4 return material authorization module (RMA) is fully integrated with the OP module for purposes of accessing prices and costs from the original invoice line. The module records and monitors customer complaints by creating a log by a user defined claim code master. The RMA module works in concert with WISE to accept the returned merchandise to the warehouse. Product returns are controlled for proper disposal through action codes. While WISE handles the receipt, condition, reason, responsibility for return and disposal action, the RMA module deals with the settlement of the claim through the issuance of a credit or no credit to the customer's account. Effective reports and screen inquiries provide a set of tools for the customer service representative.

Demand Forecasting

Accurate forecasting is the best way to keep your inventory in step with sales and minimize the twin problems of stock outs and overstocked conditions. Over stocked conditions tie up both money and storage space that could be used to improve the bottom line. Orders lost to stock outs many times are gone forever. The forecasting module is a tool that allows management to determine, with reasonable accuracy, what the projected sales of a product would be over a period of time.

The R4 demand forecasting module (DF) can be run in simulation or live mode, by item or groups of items. The forecast can be processed by batch, from a workbench, or uploaded from a spreadsheet. Forecasting uses an item's sales history, breaks it down by period, considers seasonality and trends in calculating projections forward to future periods. Future demand is projected forward with the use of exponential smoothing formulas; results can be broken down into smaller periods. After editing, the forecasts could be plugged (transferred) into DRP/MRP or MPS.



R4 Order Processing

The R4 order processing (OP) module has two functions (Order/Quote Entry and Pre-Quote Entry) that were designed to maximize the efficiency of personnel on the phone. Available to the order takers or salesmen are inventory look-ups by item numbers, descriptions, attributes and quantity information by warehouse, at a glance such as On-hand, Available, On-Order and On-PO/WO. In addition, interfaces accept customer sales orders from EDI (850) transmissions and Web order entry front ends. Up to ten different standard prices can be defined by warehouse per item and a pricing matrix allows promotional pricing and combinations by customer, customer-type, territories, and salesman to be matched to items and product-groups.

Orders are processed (picked, packed and shipped) through the Order Management and shipment scheduling functions in WISE. On-line transaction processing with complete audit capability tracks customer orders from initial creation all the way through shipment and invoicing. The various sales reports can be used to spot trends, evaluate customers, products, and salesman performance.

R4 Purchasing

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R4 ERP Manufacturing and Planning Modules

The R4 manufacturing modules were designed primarily to handle the discrete manufacturer's requirements with special emphasis on Job Shop, Make-to-Order, Engineer-to-Order, and Make-to-Stock environments. However, R4 production modules have also provide support to companies running repetitive manufacturing and process manufacturing environments. It offers extensive functionality across the breadth of manufacturing to help you provide the highest quality products while maintaining profitability through efficient and low cost production.

R4 easily responds to your business requirements with modules necessary to run your operations. At the heart of the manufacturing operations is a Manufacturing Design (BOM) module and a Production Activity Planning (PAC) module. The Product Structure serves as a central repository for all assembly and component relationships and the process (routing) identifies all discrete manufacturing steps.

The R4 planning modules enables a company to plan for long term production needs (MPS) that covers resource requirements (CRP) and short term material requirements (MRP). Master Production Scheduling (MPS) deals with first and second level products; Material Requirements Planning (MRP) provides production and procurement departments with the information needed to maintain a smooth flow of materials and supplies.

Manufacturing Design (Bill of Materials)

This is the engineering module of R4 and provides for the entry and maintenance of the Bill of Materials, the manufacturing process for finished goods and components and calculates the product costs. Full integration with all the appropriate modules helps insure complete product integrity throughout the system. Define the elements that make up the multi-level bill of material for an item with product structure maintenance.

The BM module supports unlimited levels of components and processes. Standard operations include inside and outside processing. Work centers are defined in terms of capacity, employees, machines, utilization, efficiency, direct labor and overhead costs. Cost rollup programs can be executed for individual items or all items, it enables analysis of resulting costs of materials, labor, machinery, outside processes and overhead on a "Costed Bill of Materials Report".

Production Activity Control

Working with inventory management and manufacturing design, the production activity control module (PAC) tracks manufacturing activities from issuance of work orders to completion of jobs. It encompasses shop floor control, job costing, and labor performance functions. Work orders could be manually launched, triggered by make to order environments, or created by MRP, DRP or MPS planned orders.



Work orders could be created using the standards established in the manufacturing design module and print them to provide accurate documentation on the shop floor while simplifying paper flow. Track costs by entering time and materials on a job by job basis; variance from standards are measured for material rate and efficiency, labor rate and efficiency and applied burden. The PAC module can help a company as a result of:

- Improved productivity.
- Improved quality.
- Improved customer satisfaction.
- Improved inventory control
- Improved costing

Material Requirements Planning (MRP)

R4's MRP module follows guidelines set forth by APICS and is a complete MRP system in which closed loop MRP technology drives the R4 material requirements planning module. Information from sales orders and sales forecasts, interact with the IM, PO and PAC modules, to produce a time-phased material requirements plan. These time-phased plans, use infinite backward scheduling logic to arrive at the requirement dates for unlimited planning horizons. MRP computes the requirements for both the component sub-assemblies, as well as the finished assemblies. Used properly, MRP can enable a company to achieve the following:

Master Production Scheduling

The R4 master production scheduling module (MPS) provides time-phased demand and production planning information and helps you establish the vital strategic link between corporate planning and actual production capacity. By tracking actual production against forecast, it allows you to develop realistic "on-hand" and "available-to-promise" quantities and optimize work order release and PO timing quantities. User defined planning horizons, time fences, time buckets, and sensitivity filters allows presentation of information in a more meaningful way.

The MPS module is used for projecting long-term resource requirements, calculating loads at work centers, tests the feasibility of the production plan and determines future utilization of work centers. MPS works with single and two level BOM's and integrates with MRP for detail materials planning. The MPS module helps a company to:

Increase production efficiency.

Match corporate strategy with production and marketing.

Capacity Management

To make maximum use of manufacturing production facilities, available capacities of each and every resource must be known and planned. The R4 capacity management module allows you to define and maintain resource capacities in time driven blocks. Resource bills must be defined and maintained for an item or a group of items. Production planners can generate rough-cut capacity plans, resource requirement plans and net change capacity plans.



R4's CRP analyzes data from shop orders, planned orders, and actual orders to forecast how these orders will impact shop floor capacity by work centers. It helps to first identify bottlenecks and then how to eliminate them by determining the work load for each work station. It allows you to run what if scenarios until you find the optimum plan. This is a serious tool designed to help production operations run as efficiently as possible.

Maintenance & Support

Our professional support staff is trained to assist you in every way that is required to assure you 99.5% up time and optimal performance. We have support people in the US, Europe and South America for 24/7 365 day availability. Our maintenance fees include both support and maintenance covering 24-hour-a-day, 7 days a week, and 365 days a year. Maintenance and support are 18% of the software cost, paid monthly or quarterly.

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